#2

OIPE

RAW SEQUENCE LISTING   DATE: 12/11/2001
PATENT APPLICATION: US/10/003,035   TIME: 11:47:43

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Output Set: N:\CRF3\12112001\I003035.raw   ENTERED

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        5 <120> TITLE OF INVENTION: GENETIC VACCINE AGAINST HUMAN IMMUNODEFICIENCY VIRUS
        7 <130> FILE REFERENCE: 22488-712
C--> 9 <140> CURRENT APPLICATION NUMBER: US/10/003,035
C--> 9 <141> CURRENT FILING DATE: 2001-11-01
        9 <150> PRIOR APPLICATION NUMBER: 09/585,599
       10 <151> PRIOR FILING DATE: 2000-06-02
       12 <150> PRIOR APPLICATION NUMBER: PCT/US01/18238
       13 <151> PRIOR FILING DATE: 2001-06-04
       15 <160> NUMBER OF SEQ ID NOS: 75
       17 <170> SOFTWARE: PatentIn version 3.1
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106 <213> ORGANISM: Homo sapiens
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111 1               5                   10                  15
114 Asp Phe Met Ser Leu
115              20
118 <210> SEQ ID NO: 10
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121 <213> ORGANISM: Ebola virus
123 <400> SEQUENCE: 10
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126 1               5
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134 <400> SEQUENCE: 11
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146 <223> OTHER INFORMATION: DNA of GAG site
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155 <213> ORGANISM: Artificial sequence
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160 <400> SEQUENCE: 13
162 Gly Ala Gly
163 1
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179 gaagcatcca ggaagtcagc ctaaaactgc ttgtaccaat tgctattgta aaaagtgttg    180
181 ctttcattgc caagtttgtt tcataacaaa agccttaggc atctcctatg gcaggaagaa    240
183 gcggagacag cgacgaagac ctcctcaagg cagtcagact catcaagttt ctctatcaaa    300
185 gcagtaagta gtacatgtaa tgcaacctat acaaatagca atagtagcat tagtagtagc    360
187 aataataata gcaatagttg tgtggtccat agtaatcata gaatatagga aaatattaag    420
189 acaaagaaaa atagacaggt taattgatag actaatagaa agagcagaag acagtggcaa    480
191 tgagagtgaa ggagaaatat cagcacttgt ggagatgggg gtggagatgg ggcaccatgc    540
193 tccttgggat gttgatgatc tgtagtgcta cagaaaaatt gtgggtcaca gtctattatg    600
195 gggtacctgt gtggaaggaa gcaaccacca ctctattttg tgcatcagat gctaaagcat    660
197 atgatacaga ggtacataat gtttgggcca cacatgcctg tgtacccaca gaccccaacc    720
199 cacaagaagt agtattggta aatgtgacag aaaattttaa catgtggaaa aatgacatgg    780
201 tagaacagat gcatgaggat ataatcagtt tatgggatca aagcctaaag ccatgtgtaa    840
203 aattaacccc actctgtgtt agtttaaagt gcactgattt gaagaatgat actaatacca    900
205 atagtagtag cgggagaatg ataatggaga aaggagagat aaaaaactgc tctttcaata    960
207 tcagcacaag cataagaggt aaggtgcaga aagaatatgc attttttat aaacttgata   1020
209 taataccaat agataatgat actaccagct atacgttgac aagttgtaac acctcagtca   1080
211 ttacacaggc ctgtccaaag gtatcctttg agccaattcc catacattat tgtgccccgg   1140
213 ctggttttgc gattctaaaa tgtaataata agacgttcaa tggaacagga ccatgtacaa   1200
215 atgtcagcac agtacaatgt acacatggaa ttaggccagt agtatcaact caactgctgt   1260
217 taaatggcag tctggcagaa gaagaggtag taattagatc tgccaatttc acagacaatg   1320
219 ctaaaaccat aatagtacag ctgaaccaat ctgtagaaat taattgtaca agacccaaca   1380
221 acaatacaag aaaaagtatc cgtatccaga gaggaccagg gagagcattt gttacaatag   1440
223 gaaaaatagg aaatatgaga caagcacatt gtaacattag tagagcaaaa tggaataaca   1500
225 ctttaaaaca gatagatagc aaattaagag aacaatttgg aaataataaa acaataatct   1560
227 ttaagcagtc ctcaggaggg gacccagaaa ttgtaacgca cagtttttaat tgtggagggg   1620
229 aatttttcta ctgtaattca acacaactgt ttaatagtac ttggtttaat agtacttgga   1680
231 gtactaaagg gtcaaataac actgaaggaa gtgacacaat caccctccca tgcagaataa   1740
233 aacaaattat aaacatgtgg caggaagtag gaaaagcaat gtatgcccct cccatcagtg   1800
235 gacaaattag atgttcatca aatattacag ggctgctatt aacaagagat ggtggtaata   1860
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237 gcaacaatga gtccgagatc ttcagacctg gaggaggaga tatgagggac aattggagaa  1920
239 gtgaattata taaatataaa gtagtaaaaa ttgaaccatt aggagtagca cccaccaagg  1980
241 caaagagaag agtggtgcag agagaaaaaa gagcagtggg aataggagct ttgttccttg  2040
243 ggttcttggg agcagcagga agcactatgg gcgcagcgtc aatgacgctg acggtacagg  2100
245 ccagacaatt attgtctggt atagtgcagc agcagaacaa tttgctgagg gctattgagg  2160
247 cgcaacagca tctgttgcaa ctcacagtct ggggcatcaa gcagctccag gcaagaatcc  2220
249 tggctgtgga aagataccta aaggatcaac agctcctggg gatttggggt tgctctggaa  2280
251 aactcatttg caccactgct gtgccttgga atgctagttg gagtaataaa tctctggaac  2340
253 agatttggaa taacatgacc tggatggagt gggacagaga aattaacaat tacacaagct  2400
255 taatacactc cttaattgaa gaatcgcaaa accagcaaga aaagaatgaa caagaattat  2460
257 tggaattaga taaatgggca agtttgtgga attggtttaa cataacaaat tggctgtggt  2520
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261 tactttctgt agtgaataga gttaggcagg gatattcacc attatcgttt cagacccacc  2640
263 tcccaatccc gaggggaccc gacaggcccg aaggaataga agaagaaggt ggagagagag  2700
265 acagagacag atccattcga ttagtgaacg gatccttagc acttatctgg gacgatctgc  2760
267 ggagcctgtg cctcttcagc taccaccgct tgagagactt actcttgatt gtaacgagga  2820
269 ttgtggaact tctgggacgc agggggtggg aagccctcaa atattggtgg aatctcctac  2880
271 agtattggag tcaggagcta aagaatagtg ctgttagctt gctcaatgcc acagctatag  2940
273 cagtagctga ggggacagat agggttatag aagtagtaca aggagcttat agagctattc  3000
275 gccacatacc tagaagaata agacagggct tggaaaggat tttgctataa gatgggtggc  3060
277 aagtggtcaa aaagtagtgt ggttggatgg cctgctgtaa gggaaagaat gagacgagct  3120
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285 <213> ORGANISM: Artificial sequence
287 <220> FEATURE:
288 <223> OTHER INFORMATION: Modified IL-2
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295 ttctacaaag aaaacacagc tacaactgga gcatttactg ctggatttac agatgatttt   180
·297 gaatggaatt aataattaca agaatcccaa actcaccagg atgctcacat ttaagttta   240
299 catgcccaag aaggccacag aactgaaaca tcttcagtgt cttgaagaag aactcaaacc   300
301 tctggaggaa gtgctaaatt tagctcaaag caaaaacttt cacttaagac ccagggactt   360
303 aatcagcaat atcaacgtaa tagttctgga actaaaggga tctgaaacaa cattcatgtg   420
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313 <213> ORGANISM: Artificial sequence
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323 acagtctatt atggggtacc tgtgtggaag gaagcaacca ccactctatt ttgtgcatca   180
325 gatgctaaag catatgatac agaggtacat aatgtttggg ccacacatgc ctgtgtaccc   240
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331 aagccatgtg taaaattaac cccactctgt gttagtttaa agtgcactga tttgaagaat     420
333 gatactaata ccaatagtag tagcgggaga atgataatgg agaaaggaga gataaaaaac     480
335 tgctctttca atatcagcac aagcataaga ggtaaggtgc agaaagaata tgcatttttt     540
337 tataaacttg atataatacc aatagataat gatactacca gctatacgtt gacaagttgt     600
339 aacacctcag tcattacaca ggcctgtcca aaggtatcct ttgagccaat tcccatacat     660
341 tattgtgccc cggctggttt tgcgattcta aaatgtaata ataagacgtt caatggaaca     720
343 ggaccatgta caaatgtcag cacagtacaa tgtacacatg gaattaggcc agtagtatca     780
345 actcaactgc tgttaaatgg cagtctggca gaagaagagg tagtaattag atctgccaat     840
347 ttcacagaca atgctaaaac cataatagta cagctgaacc aatctgtaga aattaattgt     900
349 acaagaccca acaacaatac aagaaaaagt atccgtatcc agagaggacc agggagagca     960
351 tttgttacaa taggaaaaat aggaaatatg agacaagcac attgtaacat tagtagagca    1020
353 aaatggaata cactttaaa acagatagat agcaaattaa gagaacaatt tggaaataat     1080
355 aaaacaataa tctttaagca gtcctcagga ggggacccag aaattgtaac gcacagtttt    1140
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363 cctcccatca gtggacaaat tagatgttca tcaaatatta cagggctgct attaacaaga    1380
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375 attgaggcgc aacagcatct gttgcaactc acagtctggg gcatcaagca gctccaggca    1740
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383 acaagcttaa tacactcctt aattgaagaa tcgcaaaacc agcaagaaaa gaatgaacaa    1980
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387 ctgtggtata taaaattatt cataatgata gtaggaggct tggtaggttt aagaatagtt    2100
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391 acccacctcc caatcccgag gggacccgac aggcccgaag gaatagaaga agaaggtgga    2220
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398 <212> TYPE: DNA
399 <213> ORGANISM: Artificial sequence
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411 ttagatcatt atataataca gtagcaaccc tctattgtgt gcatcaaagg atagagataa     240
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415 cacagcaagc agcagctgac acaggacaca gcagtcaggt cagccaaaat taccctatag     360
417 tgcagaacat ccagggggcaa atggtacatc aggccatatc acctagaact ttaaatgcat     420
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L:9 M:271 C: Current Filing Date differs, Replaced Current Filing Date